

Request for LOI: Reinvent the Toilet Challenge

Round 3

RFP Number: SOL1071002

Open Date: October 1, 2012

Proposals Due: November 8, 2012 by 11:00pm PST

WSH Program Goal

The Bill & Melinda Gates Foundation's Water, Sanitation & Hygiene team is working with partners to develop sustainable sanitation services that work for everyone. Our approach aims to expand the use of sanitation that does not connect to a sewer, as this is by far the most common type used by the poor. We invest in effective approaches that help end open defecation and unsafe sanitation and we help develop the tools and technologies that will increase access to sustainable non-piped sanitation for the urban poor.

The Sanitation Challenge

A large share of the solids and liquids people eat and drink are passed on in urine and feces. Human waste contains potentially valuable and recyclable resources such as water, energy, urea, and minerals. It also consists of large amounts of useful as well as harmful microorganisms, mostly bacteria, as well as pathogens ranging in size from viruses to helminthes. Many diseases are passed on from person to person through the fecal-oral pathway—pathogens in one person's waste end up ingested by another. For some diseases, this is the primary transmission pathway; for others, it is one of several transmission pathways. Human waste also contains residues of the many complex, engineered chemicals people use, such as food additives, antibiotics, hormones, and nutritional supplements, some of which remain in the environment and result in unsafe accumulation in waste sinks.

Goal of This Request for Letters of Inquiry

The third round of the Reinvent the Toilet Challenge is designed to prototype a means of dealing effectively and cost-efficiently with human waste for the 2.5 billion people on earth who currently lack access to safe and affordable sanitation.

Successful applicants will participate in the next phase of the Reinvent the Toilet Challenge by designing, prototyping and testing entirely stand-alone, self-contained, practical sanitation modules which intake bodily wastes or fecal sludge collected from pit latrines and septic tanks and swiftly dispose of them without any incoming water piping, outgoing sewer piping or electric or gas utility services. These modules must intake all outputs of the serviced population – ultimately at single-residence scales (smaller-scale individual family toilet solutions) or group of households (larger-scale neighborhood fecal sludge processor solutions)– with minimal module footprints and assured biosafety. The anticipated capital and operational cost for the final products (commercial units) is expected to be less than \$0.05/user/day, both for the family and neighborhood solutions. The design should anticipate

the effects and fate of complementary sanitary products entering the system such as paper, cloth, sand, and other personal hygiene products and chemicals.

How to Apply

This RFP will use a mandatory two-step application process. The first step requires the submission of a Letter of Inquiry (LOI) in the form of a 5 page concept note, detailed in the [RFLOI Overview and Guidelines](#). After evaluation of all LOIs received, the foundation will contact those applicants who are eligible and have projects of further interest to complete step two—the submission of a full proposal. If invited to submit a full proposal, instructions on the preparation of the proposal will be provided at the time of invitation.

Note: In order to ensure a timely review, we require that all letters of inquiry be submitted in English.

[Click here to Apply for this LOI](#)

More Information

- Detailed information about the objectives, scope, eligibility criteria, and application process is provided in the Reinvent the Toilet Challenge Round 3 Rules and Guidelines: [RFLOI Overview and Guidelines](#) (PDF)
- [Frequently Asked Questions](#) (PDF)
- For more information, you may email us as: GDWSHInbox@gatesfoundation.org